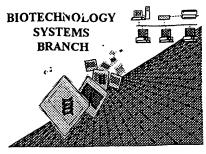
RAW SEQUENCE LISTING ERROR REPORT



29/2

The Biotechnology Systems Branch of the Scientific and Technical Information Center (STIC) detected errors when processing the following computer readable form:

Application Serial Number: 08/728,463A

Source: /644

Date Processed by STIC: $\frac{3/3o/200/}{}$

THE ATTACHED PRINTOUT EXPLAINS DETECTED ERRORS.
PLEASE FORWARD THIS INFORMATION TO THE APPLICANT BY EITHER:

- 1) INCLUDING A COPY OF THIS PRINTOUT IN YOUR NEXT COMMUNICATION TO THE APPLICANT, WITH A NOTICE TO COMPLY or,
- 2) TELEPHONING APPLICANT AND FAXING A COPY OF THIS PRINTOUT, WITH A NOTICE TO COMPLY

FOR CRF SUBMISSION QUESTIONS, PLEASE CONTACT MARK SPENCER, 703-308-4212.

FOR SEQUENCE RULES INTERPRETATION, PLEASE CONTACT ROBERT WAX, 703-308-4216. PATENTIN 2.1 e-mail help: patin21help@uspto.gov or phone 703-306-4119 (R. Wax) PATENTIN 3.0 e-mail help: patin3help@uspto.gov or phone 703-306-4119 (R. Wax)

TO REDUCE ERRORED SEQUENCE LISTINGS, PLEASE USE THE <u>CHECKER</u> <u>VERSION 3.0 PROGRAM</u>, ACCESSIBLE THROUGH THE U.S. PATENT AND TRADEMARK OFFICE WEBSITE. SEE BELOW:

Checker Version 3.0

The Checker Version 3.0 application is a state-of the-art Windows based software program employing a logical and intuitive user-interface to check whether a sequence listing is in compliance with format and content rules. Checker Version 3.0 works for sequence listings generated for the original version of 37 CFR §§1.821 – 1.825 effective October 1, 1990 (old rules) and the revised version (new rules) effective July 1, 1998 as well as World Intellectual-Property Organization (WIPO) Standard ST.25.

Checker Version 3.0 replaces the previous DOS-based version of Checker, and is Y2K-compliant. Checker allows public users to check sequence listings in Computer Readable form (CRF) before submitting them to the United States Patent and Trademark Office (USPTO). Use of Checker prior to filing the sequence listing is expected to result in fewer errored sequence listings, thus saving time and money.

Checker Version 3.0 can be down loaded from the USPTO website at the following address: http://www.uspto.gov/web/offices/pac/checker

RAW SEQUENCE LISTING DATE: 03/30/2001 PATENT APPLICATION: US/08/728,463A TIME: 15:36:33

Input Set : A:\-90-2us.app

Output Set: N:\CRF3\03302001\H728463A.raw

Does Not Comply SEQUENCE LISTING Corrected Diskette Needed 4 (1) GENERAL INFORMATION: 6 (i) APPLICANT: Lonberg, Nils 7 Kay, Robert M. 9 (ii) TITLE OF INVENTION: Transgenic Non-Human Animals for 10 Producing Heterologous Antibodies 12 (iii) NUMBER OF SEQUENCES: 409 14 (iv) CORRESPONDENCE ADDRESS: (A) ADDRESSEE: Townsend and Townsend and Crew LLP 15 (B) STREET: Two Embarcadero Center, Eighth Floor 16 17 (C) CITY: San Francisco (D) STATE: California 18 F-19 (E) COUNTRY: USA (F) ZIP: 94111-3834 20 (V) COMPUTER READABLE FORM: 22 23 (A) MEDIUM TYPE: Floppy disk (B) COMPUTER: IBM PC compatible 24 25 (C) OPERATING SYSTEM: PC-DOS/MS-DOS (D) SOFTWARE: PatentIn Release #1.0, Version #1.30 26 (vi) CURRENT APPLICATION DATA: 28 C--> 29 (A) APPLICATION NUMBER: US/08/728,463A C--> 30 (B) FILING DATE: 10-Oct-1996 31 (C) CLASSIFICATION: 89 (vii) PRIOR APPLICATION DATA: (A) APPLICATION NUMBER: US 08/544,404 34 35 (B) FILING DATE: 10-OCT-1995 38 (A) APPLICATION NUMBER: US 08/352,322 (B) FILING DATE: 07-DEC-1994 39 42 (A) APPLICATION NUMBER: US 08/209,741 (B) FILING DATE: 09-MAR-1994 43 (A) APPLICATION NUMBER: US 08/165,699 46 (B) FILING DATE: 10-DEC-1993 47 50 (A) APPLICATION NUMBER: US 08/161,739 51 (B) FILING DATE: 03-DEC-1993 (A) APPLICATION NUMBER: US 08/155,301 54 (B) FILING DATE: 18-NOV-1993 55 58 (A) APPLICATION NUMBER: US 08/096,762 59 (B) FILING DATE: 22-JUL-1993 62 (A) APPLICATION NUMBER: US 08/053,131 63 (B) FILING DATE: 26-APR-1993 66 (A) APPLICATION NUMBER: US 07/990,860 67 (B) FILING DATE: 16-DEC-1992 70 (A) APPLICATION NUMBER: US 07/904,068 71 (B) FILING DATE: 23-JUN-1992 74 (A) APPLICATION NUMBER: US 07/853,408

(B) FILING DATE: 18-MAR-1992

(A) APPLICATION NUMBER: US 07/810,279

75

78



RAW SEQUENCE LISTING

PATENT APPLICATION: US/08/728,463A

DATE: 03/30/2001 TIME: 15:36:33

Input Set : A:\-90-2us.app

Output Set: N:\CRF3\03302001\H728463A.raw

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79
             (B) FILING DATE: 17-DEC-1991
             (A) APPLICATION NUMBER: US 07/575,962
82
             (B) FILING DATE: 31-AUG-1990
83
86
             (A) APPLICATION NUMBER: US 07/574,748
             (B) FILING DATE: 29-AUG-1990
87
             (A) APPLICATION NUMBER: WO PCT/US91/06185
90
             (B) FILING DATE: 29-AUG-1991
91
     (viii) ATTORNEY/AGENT INFORMATION:
93
94
             (A) NAME: Serafini, Andrew T.
             (B) REGISTRATION NUMBER: 41,303
95
96
             (C) REFERENCE/DOCKET NUMBER: 014643-009020US
98
       (ix) TELECOMMUNICATION INFORMATION:
             (A) TELEPHONE: (415) 576-0200
99
              (B) TELEFAX: (415) 576-0300
100
```

ERRORED SEQUENCES

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3625 (2) INFORMATION FOR SEQ ID NO: 195:
               (i) SEQUENCE CHARACTERISTICS:
                                                23 shour
                    (A) LENGTH: 24 base pairs
     3628
                    (B) TYPE: nucleic acid
     3629
                    (C) STRANDEDNESS: single
     3630
     3631
                    (D) TOPOLOGY: linear
W--> 3633
              (ii) MOLECULE TYPE: DNA
              (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 195:
     3636
E--> 3638 GAAACGCAGC TGACGCAGTC TCC
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VERIFICATION SUMMARY DATE: 03/30/2001
PATENT APPLICATION: US/08/728,463A TIME: 15:36:35

Input Set : A:\-90-2us.app

Output Set: N:\CRF3\03302001\H728463A.raw

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L:29 M:220 C: Keyword misspelled or invalid format, [(A) APPLICATION NUMBER:]
L:30 M:220 C: Keyword misspelled or invalid format, [(B) FILING DATE:]
L:111 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=1
L:212 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=7
L:228 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=8
L:244 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=9
L:260 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=10
L:276 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=11
L:292 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=12
L:308 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=13
L:324 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=14
L:340 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=15
L:356 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=16
L:372 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=17
L:388 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=18
L:404 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=19
L:422 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=20
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L:458 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=22
L:476 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=23
L:494 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=24
L:512 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=25
L:528 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=26
L:544 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=27
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L:608 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=31
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L:656 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=34
L:672 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=35
L:688 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=36
L:704 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=37
L:720 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=38
L:736 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=39
L:752 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=40
L:768 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=41
L:784 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=42
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L:816 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=44
L:832 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=45
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L:880 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=48
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L:912 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=50
L:928 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=51
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VERIFICATION SUMMARY

PATENT APPLICATION: US/08/728,463A

DATE: 03/30/2001

TIME: 15:36:35

Input Set : A:\-90-2us.app

Output Set: N:\CRF3\03302001\H728463A.raw

L:944 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=52 L:960 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=53 L:976 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=54 L:992 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=55 L:2727 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:140

L:2727 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:140 L:2787 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:143

L:3638 M:254 E: No. of Bases conflict, Input:24 Counted:23 SEQ:195

L:3638 M:204 E: No. of Bases differ, LENGTH:Input:24 Counted:23 SEQ:195

L:6243 M:361 W: Invalid Split Codon, Sequence data for SEQ ID#: 298